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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/593,468

09/19/2006

Huminori Ikeda

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SUGHRUE MION, PLLC
2100 PENNSYLVANIA AVENUE, N.W.
SUITE 800
WASHINGTON, DC 20037

EXAMINER

DUCHENEAUX, FRANK D

ART UNIT

PAPER NUMBER

1788

NOTIFICATION DATE

DELIVERY MODE

12/09/2010

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

sughrue@sughrue.com
PPROCESSING@SUGHRUE.COM
USPTO@SUGHRUE.COM

Office Action Summary	Application No. 10/593,468	Applicant(s) IKEDA ET AL.	
	Examiner FRANK D. DUCHENEAUX	Art Unit 1788	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 May 2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) 1,3 and 5-8 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1, 3 and 5-8 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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DETAILED ACTION

Examiner's Note

The examiner acknowledges the addition of new claim 8 in the amendments filed 4/8/2010.

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 5/11/2010 has been entered.

Response to Amendment

2. Applicant's arguments, see pages 3 and 5, filed 4/8/2010, with respect to the rejection of claims 1, 3 and 5-7 under 35 U.S.C. 112, 1st paragraph have been fully considered and are persuasive. The rejection of claims 1, 3 and 5-7 has been withdrawn.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

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4. **Claims 1, 3 and 5-8** are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

The applicants' attention is directed to the third full paragraph on page 7 of the specification, wherein it is noted that the disclosed UV absorber is limited to those providing the disclosed spectral transmittance and being present in the disclosed amounts. The presently claimed UV absorber in current claim 1 provides for a UV stabilizer outside the scope of the specification as originally filed and thus constitutes new matter.

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. **Claim 3** is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The claim does not recite "the ultraviolet absorber," which renders the claim indefinite as it is unclear if absorber in claim 3 is in addition to that recited in claim 1.

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35

U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

9. **Claims 1, 3, 5 and 7-8** are rejected under 35 U.S.C. 103(a) as being unpatentable over Ukei et al. (US 2005/0058829 A1) in view of Endo et al. (US 6872447 B1).

Regarding claims 1, 3, 5 and 7-8, Ukei teaches a pressure-sensitive adhesive tape having a supporting substrate made of a plastic film (surface substrate film) and a PSA layer formed on at least one side of the substrate (abstract), said plastic film having a thickness of from about 50 to 200 μm (para 0050) and made of polyethylene resins such as a mixture comprising a combination of HDPE and LDPE in a weight ratio of HDPE to LDPE of 20/80 to 50/50 (para 0039), which provides a 50 to 80 pbw of LDPE to 100 pbw of the HDPE/LDPE mixture, wherein said LDPE is linear (straight chain) (para 0038).

Ukei also teaches that the PSA layer is an acrylic PSA (para 0052), said layer having a thickness of from 5 to 50 μm (para 0055), and that the HDPE and LDPE having a densities of 0.950 g/cm³ to 0.965 g/cm³ and 0.910 g/cm³ to 0.929 g/cm³, respectively (para 0039), both of which significantly overlaps those presently claimed.

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As set forth in MPEP 2144.05, in the case where the claimed range “overlap or lie inside ranges disclosed by the prior art”, a *prima facie* case of obviousness exists, *In re Wertheim*, 541 F.2d 257, 191 USPQ 90 (CCPA 1976); *In re Woodruff*, 919 F.2d 1575, 16 USPQ2d 1934 (Fed. Cir. 1990).

Ukei is silent to an ultraviolet absorber in a proportion of 0.01 to 20 parts by mass relative to 100 parts by mass of a surface substrate film, and a spectral transmittance of the surface substrate film in a wavelength region from 200 to 380 nm falls within a range from 0 to 20 %. However, Ukei does teach that the plastic film contains additives such as age resistors (para 0040, lines 1-3), said fillers used for, *inter alia*, light resistance in an amount of from 1 to 3 parts by weight based on 100 parts by weight of the resin (para 0041).

Endo teaches a surface-protective PSA sheet comprising a three-layered film comprising layer A, wherein layer A contains a polyethylene (column 1, lines 51-56), and wherein layer A contains an ultraviolet absorber in an amount of 0.05 to 0.5 % by weight based on the total weight of the layer A (column 2, lines 17-21) such as [TINUVIN 326], which is identical to the stabilizer presently disclosed (column 6, lines 10-11).

Given that the Ukei and Endo references teach a supporting substrate made of a plastic film of a compositional make-up identical to that presently claimed, including the same amounts and densities of HDPE and HDPE and the same amount of UV absorber, and having a thickness identical to that presently claimed, it is clear that the supporting substrate would intrinsically possess the presently claimed tensile modulus of elasticity and spectral transmittance.

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The recitation in the claims that the surface substrate film having a PSA layer on at least surface is “for adhering onto a motor vehicle wheel” as a “motor vehicle brake disc antirust film” is merely an intended use. Applicants attention is drawn to MPEP 2111.02 which states that intended use statements must be evaluated to determine whether the intended use results in a structural difference between the claimed invention and the prior art. Only if such structural difference exists, does the recitation serve to limit the claim. If the prior art structure is capable of performing the intended use, then it meets the claim.

It is the examiner’s position that the intended use recited in the present claims does not result in a structural difference between the presently claimed invention and the prior art and further that the prior art structure is capable of performing the intended use. Given that Ukei and Endo teach a supporting substrate made of a plastic film and a PSA layer formed on at least one side of the substrate as presently claimed, it is clear that the invention of Ukei and Endo would be capable of performing the intended use, i.e. a motor vehicle brake disc antirust film for adhering onto a motor vehicle wheel, presently claimed as required in the above cited portion of the MPEP.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to select LDPE and HDPE densities identical to those presently claimed based on the properties desirable for the a plastic film substrate, and to combine the Ukei and Endo references to provide a supporting substrate containing UV absorbers as such fillers are commonplace in the art, towards a PSA sheet that mitigates the damaging effects of UV wavelengths on both the sheet and an adherend to which the sheet is adhered as in the present invention.

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10. **Claim 6** is rejected under 35 U.S.C. 103(a) as being unpatentable over Ukei et al. (US 2005/0058829 A1) in view of Endo et al (US 6872447 B1) and in further view of Watanabe et al (US 5795650).

Regarding claim 6, Ukei and Endo teach the pressure-sensitive adhesive tape as in the rejection of claim 1 above. Ukei and Endo are silent to an acrylic polymer having a weight-average molecular weight of 500,000 to 1,100,000 crosslinked with a polyisocyanate compound.

However, Watanabe teaches a teaches a pressure sensitive adhesive sheet comprising a PSA having a polymer with a weight-average molecular weight of from 800,000 to 1,800,000, which significantly overlaps that presently claimed, to maintain a firm bonding between the PSA and a base layer (column 4, lines 28-37).

As set forth in MPEP 2144.05, in the case where the claimed range “overlap or lie inside ranges disclosed by the prior art”, a *prima facie* case of obviousness exists, In re Wertheim, 541 F.2d 257, 191 USPQ 90 (CCPA 1976); In re Woodruff, 919 F.2d 1575, 16 USPQ2d 1934 (Fed. Cir. 1990).

Watanabe also teaches that said polymer is an acrylic (column 3, lines 42-44) containing carboxylic acid group-containing monomers (column 3, lines 60-62), and said PSA further comprising isocyanate crosslinking agents (column 4, lines 19-22) such as diisocyanate (polyfunctional) (column 8, lines 13-14).

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Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the Ukei, Endo and Watanabe references towards a PSA tape comprising polyisocyanate-crosslinked acrylic polymers since it is well known on the art to crosslink acrylic polymers with an isocyanate compound, and said polymer being of a molecular weight as presently claimed towards an adhesive layer with firm bonding between said PSA layer and a base layer as in the present invention.

Response to Arguments

11. Applicant's arguments, see pages 5-6, filed 5/11/2010 and pages 5-9, filed 4/8/2010, with respect to the rejection of claims 1, 5 and 7 over Ukei et al. under 35 U.S.C. 102(a); the rejection of claim 3 over Ukei et al. in view of Endo et al. under 35 U.S.C. 103(a); and the rejection of claim 6 over Ukei et al. in view of Watanabe et al. under 35 U.S.C. 103(a) have been fully considered but they are not persuasive.

In the amendments filed 4/8/2010 and 5/11/2010, the applicants have amended the claims to further limit the densities of the HDPE and LDPE resins, the ratio of the LDPE and the tensile modulus of elasticity; to further include a UV absorber in the limitations of independent claim 1; and to limit the LDPE resin to be a straight chain LDPE resin as set forth in current claim 8.

The applicants submit that the examiner must consider the entire disclosure and suggests that the examiner has not considered the entire disclosure of Ukei, to include those portions that lead away from the currently claimed invention as suggested in a comparison of the disclosed ranges in paragraph 0039 and the examples and comparative examples of Ukei.

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The applicants argue that preferred ranges of the densities of the HDPE and LDPE in paragraph 0039 of Ukei is incorrect based on a comparison of the ranges in Comparative Examples 3 and 5 of Ukei. Indeed, the applicants assert that the comparative examples of Ukei, which exhibit undesirable effects, are inconsistent with the preferred density ranges of the HDPE and LDPE as set forth in paragraph 0039 of the Ukei disclosure, which the applicants argue, can not be ignored by the examiner.

With respect to the arguments set forth in the applicants' arguments filed 4/8/2010, the applicants' attention is directed to the advisory action mailed 4/21/2010, wherein it is the examiner's position that a fair and complete response to said arguments was provided.

With respect to the arguments filed 5/11/2010, the examiner respectfully disagrees. The applicants' attention is directed to the para 0096 of Ukei, wherein it is clear that the Ukei invention, while referencing specific embodiments, is not limited to said embodiments and that "various changes and modifications can be made therein without departing from the spirit and scope thereof."

As set forth in paragraph 0039, it is also clear that Ukei has provided the ranges of the densities of the HDPE and LDPE resins and HDPE/LDPE ratios that may be employed within the scope of the Ukei invention, even if all of the preferred densities, combination of densities, and ratios within said ranges are not represented in the examples or if a sampling of these ranges are included in the comparative examples of the reference.

Certainly, one of ordinary skill in the art would be apprised that the densities of the resins disclosed in both the examples and the comparative examples are not the only factors at issue in preserving the scope of the referenced invention.

As noted previously, “nonpreferred disclosures can be used. A nonpreferred portion of a reference disclosure is just as significant as the preferred portion in assessing the patentability of claims.” *In re Nehrenberg*, 280 F.2d 161, 126 USPQ 383 (CCPA 1960). Further, while the examples of Ukei demonstrate a few combinations of specific HDPE and LDPE resins, having specific densities and being in specific ratios to one another, the preferred densities and preferred ratios as set forth in paragraph make it clear to the skilled artisan that the Ukei invention is not limited to those combinations disclosed in the examples

Thus, it is the examiner’s position that each and every element, such as the examples, of the Ukei disclosure need not fall within the scope of the presently claimed invention in order for the Ukei reference to be a valid and relevant prior art reference. It is significant to note that the LDPE and HDPE used in the comparative examples of Ukei have nearly identical densities as those used in the inventive examples which exhibit good effects

Finally, it is noted that “the arguments of counsel cannot take the place of evidence in the record”, *In re Schulze*, 346 F.2d 600, 602, 145 USPQ 716, 718 (CCPA 1965). It is the examiner’s position that the arguments provided by the applicant regarding the Ukei reference being inconsistent with its own disclosed invention in its entirety as compared to specific examples also provided therein must be supported by a declaration or affidavit. As set forth in MPEP 716.02(g), “the reason for requiring evidence in a declaration or affidavit form is to obtain

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the assurances that any statements or representations made are correct, as provided by 35 U.S.C. 24 and 18 U.S.C. 1001.”

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to FRANK D. DUCHENEAUX whose telephone number is (571)270-7053. The examiner can normally be reached on M-Th, 7:30 A.M. - 5:00 P.M..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Callie E. Shosho can be reached on (571)272-1123. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/F. D. D./

Examiner, Art Unit 1788

/Callie E. Shosho/

Supervisory Patent Examiner, Art Unit 1787

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